# CiscoAdvantage

This section provides an overview of the Cisco Advantage solution. Cisco Systems has long been supplying organizations with the world's largest, most scalable intranets. Now Cisco is about to make the biggest network of them all—the Internet—available to more people than ever before.

# CiscoAdvantage Overview

CiscoAdvantage is Cisco's solution for helping your business benefit from the combined capabilities of your intranet and the Internet. With CiscoAdvantage, you can begin to realize the many possibilities inherent in the power of these networks.

The CiscoAdvantage solution delivers Internet technology and the benefits of the Internet to your business in three important ways:

- It makes the Internet more accessible to more people, thus expanding the community of users who can take advantage of Internet resources. This means that more of your customers, vendors, and enterprise partners can communicate and conduct business in a cost-effective, expeditious, and productive manner.
- It ensures the security of your organization's intranets, data, and users from access and influence by outside intruders.
- It provides tools that help you easily take advantage of Internet-based services and
  applications. For example, your business can productively use applications originally
  designed for the public Internet (such as the World Wide Web) on both the Internet and
  your private intranet. This capability enables you to automate, streamline, or eliminate
  processes that today require extra time, effort, and cost, such as information
  dissemination, enrollment and registration, surveys and market research, and business
  transactions.

The CiscoAdvantage products deliver robust options for securing your applications, especially those requiring high levels of protection for sensitive company data such as intellectual property, financial data, and transactions. Cisco also provides solid solutions for scaling key applications—such as World Wide Web and File Transfer Protocol (FTP) applications—to accommodate access by millions of users. High performance and reliability let you provide around-the-clock access to information, products, and services offered via the Web.

# Server and Client Software

The CiscoAdvantage server and client software consist of the following products:

- Cisco MultiNet for OpenVMS
- Cisco Secure/IP for OpenVMS
- Cisco TCP/IP Suite 100
- Cisco TCP/IP Stack 100
- Cisco Web Server
- Cisco IPeXchange Internet Gateways

## Cisco MultiNet for OpenVMS

MultiNet for OpenVMS software allows DEC users to upgrade from the proprietary DECnet protocol to TCP/IP. Cisco MultiNet for OpenVMS delivers the entire TCP/IP environment to users on an OpenVMS platform, including Internet, World Wide Web services, LAN and WAN connectivity, electronic mail, tape backup, file transfer, load balancing, improved print services, symmetric multiprocessing, time synchronization, and user authentication. Cisco MultiNet for OpenVMS can seamlessly transform a DECnet or DECnet/OSI network to TCP/IP without user retraining, application recoding, or network downtime. DECnet and DECnet/OSI applications can run directly over TCP/IP without modification. Users continue using commands familiar in the DECnet environment while network administrators migrate their networks to TCP/IP at their own pace. Cisco MultiNet for OpenVMS delivers open networking and unparalleled system reliability and security.

## Cisco Secure/IP for OpenVMS

An optional package for Cisco MultiNet for OpenVMS, this product prevents TCP/IP networked systems from unauthorized user access. It simplifies security management by providing a single OpenVMS utility for managing hand-held tokens, supporting the leading token-based products in the market today.

### Cisco TCP/IP Suite 100

Cisco TCP/IP Suite 100 offers a "data center" level of reliability, performance, and features down to the desktop, and is available on Windows 3.x, Windows 95 and Windows NT. Cisco TCP/IP Suite 100 includes a network files system (NFS) client; Telnet with TN3270, TN5250, and VT420 emulation; and FTP file transfer. Also included are Pronto mail and the enhanced Mosaic Web browser as well as enhanced security features.

#### Cisco TCP/IP Stack 100

Cisco TCP/IP Stack 100 delivers the fastest TCP/IP performance for Windows 3.x and Windows 95. Cisco TCP/IP Stack 100 is a 32-bit virtual device driver implementation that delivers high performance and WINSOCK 1.1 compatibility. The Stack includes an SNMP agent and supports Ethernet, Token Ring, FDDI, dial-up, and ISDN interfaces. Online documentation and the unique Configuration Wizard ensure smooth installation and ease of use.

#### Cisco Web Server

Cisco Web Server is the fastest performing, multithreaded server for the enterprise. Cisco Web Server is available for Windows NT, Window 95, OpenVMS, and Solaris platforms. It provides an HTML-based management interface for ease of use, proxy server to reduce network bandwidth demands, and flexible security and access control.

## Cisco IPeXchange Internet Gateways

Cisco IPeXchange server software runs on Cisco 1000 series hardware, providing access to TCP/IP services over Internetwork Packet Exchange (IPX) networks as well as WAN connectivity and firewall security between local and remote networks. These innovative products combine software and hardware to provide both IPX-to-IP gateway functionality and remote network connectivity in standalone products, eliminating the need for separate gateway and bridge/router solutions.

# Internet Systems

The CiscoAdvantage Internet Systems consist of the following hardware products:

- IPeXchange 1000 Series
- Cisco PIX Firewall
- Cisco LocalDirector
- Cisco DistributedDirector

## IPeXchange 1000 Series

Three Cisco IPeXchange 1000 Series hardware platforms are available. The IPeXchange 1003 and IPeXchange 1004 support Ethernet-to-Integrated Services Digital Network (ISDN) connectivity. The IPeXchange 1005 supports Ethernet-to-Frame Relay or Ethernet-to-leased line connectivity. All Cisco IPeXchange 1000 Series Internet Gateways support Point-to-Point Protocol (PPP), compression, and several other powerful features for optimizing WAN bandwidth and costs.

#### Cisco PIX Firewall

Cisco PIX Firewall combines hardware and software to provide full firewall protection that completely conceals the architecture of an internal network from the outside world. PIX Firewall is based on address translation that solves both security concerns and issues surrounding IP address shortages. PIX Firewall allows secure access to the Internet from within existing private networks as well as the ability to expand and reconfigure TCP/IP networks without being concerned about availability of IP addresses.

#### Cisco LocalDirector

Cisco LocalDirector is a device that dynamically load-balances traffic between multiple collocated servers to ensure timely access and response to requests. It is independent of domain name servers and applications. Rather, it functions as a front end to a group of servers, balancing traffic demands between servers and speeding user access to server-based applications. Servers can be added and removed transparently, but to end users LocalDirector provides the appearance of a single, "virtual" server.

#### Cisco DistributedDirector

Like LocalDirector, Cisco's DistributedDirector performs load-sharing tasks, but DistributedDirector distributes sessions over geographically dispersed servers using the intelligence in the internetwork. DistributedDirector takes into account server availability, load on a particular server, and proximity to the user to determine the best route to the most available server. To users, it appears that there is only one server; however, with DistributedDirector, individual "real" servers can be added and removed as needed without affecting network performance. This capability allows users to quickly obtain service or data that best meets their needs.

# A Comprehensive Solution

Together with the Cisco Internetwork Operating System (Cisco IOS) software, CiscoAdvantage solutions allow you to maximize the capabilities of your intranet while providing access to Internet services. And because Cisco offers a complete, end-to-end solution, you can enter the world of "virtual" business at your own pace with the specific Internet solutions your business needs.